

**IN THE UNITED STATES PATENT AND TRADEMARK OFFICE**

Applicant: JOHNSON et al. )  
Application No.: ) Group Art Unit: n/a  
Filed: March 3, 2004 ) Examiner: n/a  
For: MISCHMETAL OXIDE TBC

Mail Stop PATENT APPLICATION  
Commissioner for Patents  
P.O. Box 1450  
Alexandria, VA 22313-1450

**INFORMATION DISCLOSURE STATEMENT**

SIR:

The following are included with this Information Disclosure Statement:

- ☒ **A. PTO/SB/08**
- ☐ **B. CERTIFICATION**  
(37 C.F.R. 1.97(c)-before final Office Action or allowance)
- ☐ **C. \$180.00 FEE PAYMENT**  
(37 C.F.R. 1.97(c)-before final Office Action or allowance)
- ☐ **D. \$180.00 PETITION, CERTIFICATION & PETITION FEE  
PAYMENT**  
(37 C.F.R. 1.97(d)-before issue fee payment)

The following are submitted in the above-identified application in compliance with 37 CFR 1.98:

- ☐ **I.** A copy of each listed U.S. Patent and U.S. Patent application publication [1.98(a)(2)(i)].
- ☒ **II.** A copy of each listed foreign patent and/or published foreign patent application. For each listed foreign patent and/or published foreign patent application [1.98(a)(2)]:
- ☒ **a)** the English language version or an English translation if not published in English, if available (see PTO-1449)[1.98(a)(3)]; and/or

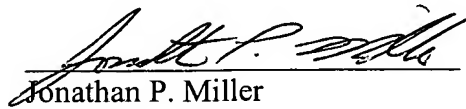
- ☐ (b) U.S. counterpart patents or English language equivalents of the foreign patents or published foreign patent applications (see PTO-1449); and/or
- ☐ (c) a concise explanation of the relevance of the listed patents, publications or other information (see PTO-1449, foreign search report or other, attached), as it is presently understood by the person signing this disclosure, since no English translation is currently available[1.98(a)(3)].
- ☐ III. A copy of each listed publication, other than published foreign applications. For each listed publication [1.98(a)(2)]:
  - ☐ (a) an English translation, if available, when the original publication is not in the English language (see PTO-1449)[1.98(a)(3)];
  - ☐ (b) a concise explanation of the listed publications (see PTO-1449), as it is presently understood by the person signing this disclosure, since no English translation is currently available [1.98(a)(3)].
- ☐ IV. For any other listed information, a copy of the information or that portion which caused it to be listed (see PTO-1449)[1.98(a)(2)(iii)].
- ☐ V. Each listed U.S. Patent, Publication or other information that was previously cited by or submitted to the Office in a prior application, which application is relied upon for an earlier filing date under 35 U.S.C. § 120 [1.98(d)].
- ☒ VI. Copies of each listed U.S. Patent and U.S. Patent application publication are not being submitted herewith pursuant to a waiver of 37 CFR 1.98(a)(2)(i) by the USPTO on July 11, 2003 for applications filed after June 30, 2003.

This information is submitted in the above-identified application in compliance with 37 C.F.R. 1.97 because:

- ☒ 1. This information disclosure is submitted within three months of the filing date of the application, or before the mailing date of the first office action on the merits of the application [1.97(b)].
- ☐ 2. This information disclosure is submitted before the mailing date of a final action in this application under 1.113[1.97(c)] and the requisite statement or fee is provided (see items 6 or 7 below).
- ☐ 3. This information disclosure is submitted before the mailing date of a notice of allowance under 1.311 [1.97(c)] and the requisite statement or fee is provided (see items 6 or 7 below).

- ☐ 4. This information disclosure is submitted after the mailing date of a final action under 1.113 [1.97(d)] and the requisite statement and fee is provided (see items 6 and 8 below).
- ☐ 5. This information disclosure is submitted after the mailing date of a notice of allowance under 1.311, but before the payment of the issue fee [1.97(d)] and the requisite statement and fee is provided (see items 6 and 8 below).
- ☐ 6. This information disclosure statement is submitted with the statement required for items 2, 3, 4 or 5 above [1.97(c), (d), (e)]:
- ☐ I, , hereby state the following:
- ☐ Each item of information contained in this information disclosure statement was cited in a communication from a foreign patent office in a counterpart foreign application not more than three months prior to the filing of this statement.
- ☐ No item of information contained in this information disclosure statement was cited in a communication from a foreign patent office in a counterpart foreign application and, to the knowledge of the person signing this certification after making reasonable inquiry, no item of information contained in this information disclosure was known to any individual designated in 1.56(c) more than three months prior to the filing of this information disclosure statement.
- ☐ 7. This information disclosure statement is submitted with the fee of \$180 set forth in 1.17(p) [see items 2 and 3 above]. Please charge this fee and any other fees associated with this application to Deposit Account No. 50-1059. (Please note, no fee is required for items 2 and 3 above if the Item 6 statement is provided).
- ☐ 8. Please charge this fee and any other fees associated with this application to Deposit Account No. 50-1059.

Respectfully submitted,

  
Jonathan P. Miller  
Reg. No. 48,483

Substitute for form 1449A/PTO

**INFORMATION DISCLOSURE  
STATEMENT BY APPLICANT**

(Use as many sheets as necessary)

Sheet 1 of 2

**Complete if Known**

Application Number	
Filing Date	March 3, 2004
First Named Inventor	JOHNSON et al.
Art Unit	n/a
Examiner Name	n/a
Attorney Docket Number	13DV-13810 (07783-0090)

**U.S. PATENT DOCUMENTS**

Examiner Initials *	Cite No. <sup>1</sup>	Document Number	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		Number - Kind Code <sup>2</sup> (if known)			
	A	US-6,620,465 B2	09-16-2003	Rigney et al.	
	B	US- 6,589,351 B1	07-08-2003	Bruce et al.	
	C	US- 6,342,278 B1	01-29-2002	Rigney et al.	
	D	US- 6,194,083 B1	02-27-2001	Yasuda et al.	
	E	US- 6,015,630	01-18-2000	Padture et al.	
	F	US- 5,993,980	11-30-1999	Schmitz et al.	
	G	US- 5,961,750	10-05-1999	Boffito et al.	
	H	US- 5,698,273	12-16-1997	Azad et al.	
	I	US- 5,504,195	04-02-1996	Leedham et al.	
	J	US- 5,499,905	03-19-1996	Schmitz et al.	
	K	US- 5,455,119	10-03-1995	Taylor et al.	
	L	US- 5,418,003	05-23-1995	Bruce et al.	
	M	US- 5,277,936	01-11-1994	Olson et al.	
	N	US- 5,264,634	11-23-1993	Becker et al.	
	O	US- 4,913,961	04-03-1990	Jones et al.	
	P	US- 4,590,090	05-20-1986	Siemers et al.	
	Q	US- 4,503,128	03-05-1985	Iseli et al.	
	R	US- 4,448,748	05-15-1984	Radtke et al.	
	S	US- 4,447,503	05-08-1984	Dardi et al.	
	T	US- 4,347,082	08-31-1982	Osumi et al.	

**FOREIGN PATENT DOCUMENTS**

Examiner Initials*	Cite No. <sup>1</sup>	Foreign Patent Document	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear	T <sup>6</sup>
		Country Code <sup>3</sup> - Number <sup>4</sup> - Kind Code <sup>5</sup> (if known)				
	U	JP 2000087208	03-28-2000	Nippon Steel Hardfacing Co. Ltd. Paurekkusu KK		
	V	JP 10087326	04-07-1998	Yao Takeshi		
	W	JP 08337803	12-24-1996	Sanyo Special Steel Co. Ltd. & Sanyo Electric Co. Ltd.		
	X	JP 07145407	06-06-1995	Teikoku Piston Ring Co. Ltd.		
	Y	JP 06136461	05-17-1994	Showa Denko KK		
	Z	JP 62017168	01-26-1987	Mazda Motor Corp.		
	AA	JP 55115919	09-06-1980	Nat'l Res. Inst. for Metals		
	AB	WO 00/06796	02-10-2000	Imperial College of Science, Technology and Medicine		

Examiner  
SignatureDate  
Considered

\*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant. <sup>1</sup> Applicant's unique citation designation number (optional). <sup>2</sup> See Kinds Codes of USPTO Patent Documents at [www.uspto.gov](http://www.uspto.gov) or MPEP 901.04. <sup>3</sup> Enter Office that issued the document, by the two-letter code (WIPO Standard ST.3). <sup>4</sup> For

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**Complete if Known**

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<i>Filing Date</i>	March 3, 2004
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<i>Attorney Docket Number</i>	13DV-13810 (07783-0090)

**(Use as many sheets as necessary)**

Sheet	2	of	2
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[illegible][illegible]Date  
Considered

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This collection of information is required by 37 CFR 1.97 and 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 2 hours to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. **SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.**

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